25X1 3	Approved F Release 2005/05/20: CIA-RDP78B04770A001600010105-9
	CONFIDENTIAL Copy 2 of 3
	May 23, 1967 25X1
25X1	Declass Review by NGA.
·	Fort Davis Station Washington, D. C. 20020
25X1	Reference: Subject: Thirty-Fourth Monthly Report Gentlemen:
•	Enclosed are five (5) copies of the thirty-fourth Monthly Letter Report covering the period of April 1, 1967, to April 30, 1967, in accordance with the referenced contract.
	Yours truly, INFORMATION SYSTEMS MARKETING AND PLANNING DEPARTMENT 25X1 Contract Administrator
	WK:ks
	Encs: one (1) to Contracting Officer four (4) directly to Technical Monitor
: !	"This material contains information affecting the national detense of the United States within the meaning of the espionace laws, Title 18, U. S. C., sections 793 and 794, the transmission or revelation of which in any manner to an unauthorized person is prohibited by law."
: :	

COMPIDENTIAL

25X1

CONTACT DUPLICATING AND RESEAU PRINTER
AND

HIGH RESOLUTION STEP AND REPEAT PRINTER

THIRTY-FOURTH MONTHLY LETTER REPORT

May 10, 1967

Period: April 1, 1967 to April 30, 1967

·

25X1

TABLE OF CONTENTS

Section	No.		Page No.
1.0	Cont	act Duplicating & Reseau Printer	
	1.1	Purpose	1
	1.2	Activity of this Report Period	1
	1.3	Plans for Next Period	2
	1.4	Problems	2
	1.5	Documentation	2
	1.6	Questions Outstanding	2
2.0	Hig	h Resolution Step & Repeat Printer	<u>:</u>
	2.1	Purpose	2
	2.2	Activity of this Report Period	3

1.0 CONTACT DUPLICATING AND RESEAU PRINTER

1.1 Purpose

The overall objective of the current contract is the design, fabrication, test and delivery of a photographic step and repeat Contact Duplicating and Reseau Printer. Prime design goals are high-speed automatic operation, variable format capability, and high resolution with minimum film distortion or damage. The delivered equipment will be suitable for operational use. The printer will accommodate films of 70mm to $9\frac{1}{2}$ " width with frame lengths up to 30 inches and will provide operation in the Reseau mode and selective mode as options.

1.2 Activity of this Report Period

A meeting was held on April 5, 1967 with the customer to demonstrate the results of a series of tests designed to measure circuit stability, exposure uniformity in Manual and Automatic modes, and limiting parameters of the Automatic Exposure Control System.

By means of inspecting a series of $9\frac{1}{2}$ " x 30" processed exposures, stability and uniformity were established. The limiting conditions of the Automatic Exposure Control system were determined by simulated imagery involving squares of various sizes and densities superimposed upon various background densities.

Demonstration was also made of the system capability for contrast enhancement and density compression using "typical" imagery.

Resolution of more than 300 lpm was demonstrated with the Mylar interlayer installed in the printer.

Following the Test Demonstration, proposals were requested by the customer for further improving printer performance and reliability. Proposals were submitted verbally on April 7, 1967 to modify the lamp/photocell circuitry for improved stability and reliability, and to modify the photocell aperture plate for increased photocell current which will permit greater latitude of input density.

The Pre-View and Punch Station has been received from the sub-contractor and made operational. A number of improvements have been incorporated to improve scope illumination, ease of operation, and to simplify calibration procedures.

Preliminary tests have been made using a dummy aperture plate with reflective inserts having various hole tapers. A substantial increase in photocell current has been proven which will extend the latitude of input densities which can be tolerated by the lamp/photocell circuitry.

1.3 Plans for Next Report Period

Finalize chart for Film Metering System and test using Frame Sensing Detector.

Make further résolution tests using target supplied by customer.

Complete updating of Operations Manual

1.4 Problems

None

1.5 <u>Documentation</u>

Formal proposals have been submitted for the requested modifications.

1.6 Questions Outstanding

Plans for the next report period are dependent upon receiving approval from the customer regarding the proposed modifications. A decision on whether to complete the printer for shipment or initiate modifications is awaited.

2.0 High Resolution Step and Repeat Printer

2.1 Purpose

The purpose of this effort is to design, fabricate, test and deliver in twenty months a high precision step and repeat, photographic contact printer. This printer will be capable of producing photographic contact prints of the highest possible quality, resolution, and acutance from roll film of widths varying from 70mm to $9\frac{1}{2}$ " and in pre-selected frame lengths from 5 inches up to a maximum of 30 inches.

Approved For Release 2005/05/20 : CIA-RDP78B04770A00g600201010539

2.2 Activity of this Report Period

There was no activity this month. The Stop-work period expired 11 January 66. is still awaiting Government direction.

25X1

Page 3 of 3